

## Quanxi JIA

Fellow: Los Alamos National Laboratory  
Fellow: American Physical Society  
Fellow: American Ceramic Society  
Fellow: American Association for the Advancement of Science

### EDUCATION

09/1991	<b>Ph.D.</b> in Electrical & Computer Engineering, SUNY at Buffalo, NY
04/1985	<b>M.S.</b> in Electronic Engineering, Jiaotong Univ., Xian, China
07/1982	<b>B.S.</b> in Electronic Engineering, Jiaotong Univ., Xian, China

### PROFESSIONAL EXPERIENCE

09/2003 - present	Laboratory Fellow, Los Alamos National Laboratory (LANL)
12/2009 - present	Thrust Leader, Center for Integrated Nanotechnologies, LANL
10/1997 - 12/2009	Team Leader, Superconductivity Technology Center, LANL
01/1996 - present	Technical Staff Member, LANL
08/1993 - 01/1996	Postdoctoral Fellow, LANL
04/1993 - 12/1993	Visiting Associate Professor, Kumamoto University, Japan
09/1991 - 08/1993	Research Associate, State University of New York (SUNY) at Buffalo
09/1988 - 08/1991	Teaching Assistant, SUNY at Buffalo
02/1988 - 08/1988	Research Associate, SUNY at Buffalo
12/1987 - 01/1988	Assistant Professor, Jiaotong Univ., Xian, China
05/1985 - 11/1987	Research Associate, Jiaotong Univ., Xian, China

### FUNDED PROJECTS, PATENTS, PUBLICATIONS, &PRESENTATIONS

- More than 40 funded projects
- 39 US patents issued
- More than 380 peer reviewed journal articles
- More than 80 invited conference presentations and seminars
- 8 book chapters, and over 60 refereed/un-refereed proceeding articles

### HONORS

- Fellow of American Association for the Advancement of Science (2011)
- Postdoctoral Distinguished Mentor Awards, LANL (2010)
- Fellow of American Ceramic Society (2010)
- Adjunct Professor, State Univ. of New Mexico, Las Cruces, NM (2010 - present)
- Fellow of American Physical Society (2009)
- The Outstanding Women's Career Development Mentoring Awards, LANL (2008)
- The Federal Laboratory Consortium for Technology Transfer Awards (2008)
- Adjunct Professor, Jiaotong Univ., Xian, China (2008 - present)
- Asian-American Engineer of the Year Award (2005)

- Laboratory Fellow of Los Alamos National Laboratory (2003)
- R&D 100 award - Flexible Superconducting Tape (2003)
- Los Alamos National Laboratory Achievement Award (2000)
- R&D 100 award - Underground Radio (1998)
- Listed in *Who's Who in Science and Engineering*
- Listed in *American Men and Women of Science*
- Award for Excellence in Industrial Partnerships at LANL (1996)
- National Link Foundation Fellowship Award at SUNY (1990 - 1991)
- Distinguished Teaching Award at Jiaotong University (1986 - 1987)

## RESEARCH INTERESTS

- Synthesis and structure-property relationships of nanostructured materials, multifunctional materials, thin films and multilayer systems. In particular, the growth of nanocomposite and multilayer metal-oxide thin films, the mechanism of film growth, optical/electrical properties of the films, and device applications of the films
- Novel deposition techniques for the growth of electronic materials with controlled structural and transport properties
- Development and fabrication of high-temperature superconducting films for coated conductors and devices, device applications of high temperature superconductor materials
- Development and fabrication of novel solid-state microelectronic/electro-optic devices, research on advanced semiconductor devices and materials
- Development and study of energy materials and devices

## PROFESSIONAL SERVICES

- Have served as reviewer for the following technical journals: *Science*, *Adv. Mater.*, *Adv. Functional Mater.*, *Appl. Phys. Lett.*, *J. Appl. Phys.*, *J. Vac. Sci. Technol.*, *J. Mater. Res.*, *Integrated Ferroelectrics*, *Ferroelectrics*, *IEEE Trans. Appl. Supercond.*, *IEEE Electron Devices Lett.*, *Phil. Mag. B*, *Physica B*, *Physica C*, *J. Am. Ceramic Soc.*, *Thin Solid Films*, *J. Phys. Chem. B*, *Chem. Mater.*, *J. Am. Chem. Soc.*, *ACS Nano*, *Small*, *Angew. Chem. Int. Ed.*, *J. Phys. Chem.*, *Phys. Status Solidi (a)*, *Appl. Surf. Sci.*, *Electrochem. Solid-State Lett.*, *Int. J. Photoenergy*, *Supercond. Sci. Technol.*, *J. Crystal Growth*, *Crystal Growth & Design*, and *Rev. Sci. Instrum.*
- Have sat on the Editorial Board for *J. Semiconductors*, IOP Publishing (2010 – present)
- Have sat on the International Editorial Board for *Trans. Electrical & Electronic Materials*, Korean IEEE (2010 – present)
- Have served in the Executive Committee of the Electronics Division, American Ceramic Society (ACerS): Secretary-Elect (2008 - 2009); Secretary (2009 - 2010); Vice-Chair & Program Chair (2010 - 2011); Chair-Elect (2011 - 2012)
- Served as Chair of Award Committee of the Electronics Division, ACerS (2007 - 2008)
- Have served in LANL Fellows Organization: Secretary (2009 - 2010); Deputy Coordinator (2010 - 2011); Coordinator (2011 - 2012)
- Was Chair of LDRD-DR Sci./Eng. Advisory Panel (2010); Member of the Proposal Review Committee for the LDRD-ERs (1996, 1997, 2000, 2001)

- Was a member of the Postdoctoral Selection Committee at LANL (2002 – 2005)
- Sat on the Division Deputy Leader Selection Committee for Materials Science & Technology Division at LANL (2003)
- Served in the NSF MRI/IMR Program Review Panel (2000)
- Have been a proposal reviewer for NSF, BES/DOE, SBIR, and Singapore funding agencies
- Was an external reviewer for the Korea Science Prizes (2003)
- Have served in the organizing committees of over 20 international Symposia/conferences

#### **TEACHING AND MENTORING**

- Have supervised 25 postdoctoral and graduate students
- Have been supervising and mentoring college and high school interns

#### **MEMEBERSHIPS**

American Physical Society (APS)      American Ceramic Society (ACerS)  
 Materials Research Society (MRS)      Institute of Electrical & Electronics Engineers (IEEE)  
 American Association for the Advancement of Science (AAAS)